

## REMARKS

Reconsideration and the timely allowance of the pending claims, in view of the following remarks, are respectfully requested.

In the pending Office Action, the Examiner rejected claims 8-9 and 15, under 35 U.S.C. §103(a), as being unpatentable over Kiuchi '262 (U.S. Patent No. 5,589,262). The Examiner also objected to claims 17-18, but indicated that these claims would be allowable if rewritten in independent form.

Prior to this Amendment, claims 8-9, 15, and 17-18 were pending. By this Amendment, Applicants have introduced new independent claims 19-20 that are the equivalent of dependent claims 17-18 rewritten in independent form and, as indicated by the Examiner, are immediately allowable. As such, claims 8-9, 15, and 17-20 are currently presented for examination, of which claims 8, 15, and 19-20 are independent.

Applicants respectfully traverse the rejection under 35 U.S.C. §103(a) for the reasons presented below.

### I. Rejection of Independent Claims 8 & 15 Under §103(a).

Independent claims 8 and 15 each recite, *inter alia*:

***a soft magnetic laminate layer having a thickness of 500Å to 4000Å***  
formed between the nonmagnetic substrate and the perpendicular magnetic medium, and including a first soft magnetic layer, and a second soft magnetic layer laminated in contact with said first soft magnetic layer, and differing from said first soft magnetic layer in the crystal structure . . .

As disclosed by the description of the embodiments, the claimed structure suppresses domain wall generation while suppressing noise from the soft magnetic layers. (*See, e.g.*, Specification: page 12, line 26 - page 13, line 6). As disclosed in the Specification, the suppression of noise may be achieved by (a): employing a construction that suppresses motion of a domain wall within a soft magnetic laminate layer, or (b) employing a construction that eliminates the domain wall. (*See,*

Specification: page 3, line 20).

The present invention, as disclosed by the description of the various embodiments, is dedicated to a construction that suppresses the generation of a domain wall. (See, e.g., page 13, lines 4-6).

However, unlike the present invention, the Kiuchi '262 reference discloses that the soft magnetic laminate layer comprises a first soft magnetic layer and a second soft magnetic layer differing from the first soft magnetic layer in the *domain wall construction*. Specifically, the Kiuchi '262 reference discloses a recording medium **1C** that has a under layer **4C**, which has a double-layered structure in which the under layer **4C** is made up of a first soft magnetic under layer **4ca** that has a *stripe magnetic domain structure* and a second soft magnetic under layer **4cb** that has an *in-plane magnetic domain structure*. (See, col. 9; lines 12-17; FIG. 12). The Kiuchi '262 reference goes on to disclose another recording medium **1D** having a under layer **4D**, which also has a double-layered structure such that the under layer **4D** is made up of a first soft magnetic under layer **4da** that has an *in-plane magnetic domain structure* and a second soft magnetic under layer **4db** that has a *stripe magnetic domain structure*. (See, col. 9; lines 18-23; FIG. 13). In other words, the disclosed soft magnetic layer of the Kiuchi '262 reference requires a domain wall.

Moreover, the present invention, as recited by independent claims 8 and 15, provide that the soft magnetic laminate layer has a thickness of 500Å to 4000Å. In contrast, the Kiuchi '262 reference teaches that the soft magnetic layer has a thickness within the range of 4.0 – 20.0 μm (40,000Å - 200,000Å), which is not only clearly beyond the 500Å - 4000Å range of the present invention but also prevents the domain wall from being eliminated. (See, e.g., col. 21, lines 28-29).

Because, as indicated above, Kiuchi '262 fails to teach or suggest the combination of elements recited by independent claims 8 and 15, Applicants submit that independent claims 8 and 15 are patentably distinguishable over this reference. Applicants further submit that, as best understood, none of the references of record

render claims 8 and 15 unpatentable.

**II. Conclusion**

For the reasons discussed above, Applicants submit that independent claims 8 and 15 are patentably distinguishable over all the references of record. Dependent claims 9, 17, and 18 are also patentable by virtue of their additional recitations as well as their dependency to independent claims 8 and 15, respectively. Moreover, because independent claims 19-20 include similar features to independent claims 8 and 15, claims 19-20 are at least patentable for the same reasons as claims 8 and 15, as well as for the reasons indicated by the Examiner. Accordingly, withdrawal of the rejection of the pending claims, under 35 U.S.C. §103(a), is respectfully requested.

All matters having been addressed, Applicants respectfully request the entry of this Amendment, the Examiner's reconsideration of this application, and the immediate allowance of pending claims 8-9, 15, and 17-20. Applicants' Counsel remains ready to assist the Examiner in any way to facilitate and expedite the prosecution of this matter.

Please charge any fees associated with the submission of this paper to Deposit Account Number 033975. The Commissioner for Patents is also authorized to credit any over payments to the above-referenced Deposit Account.

Respectfully submitted,

**PILLSBURY WINTHROP LLP**



E. RICO HERNANDEZ

Reg. No. 47641

Tel. No. (703) 905-2088

Fax No. (703) 905-2500

ERH/smm  
P.O. Box 10500  
McLean, VA 22102  
(703) 905-2000